

State of Alaska FY2008 Governor's Operating Budget

Department of Natural Resources North Latitude Plant Material Center Component Budget Summary

Component: North Latitude Plant Material Center

Contribution to Department's Mission

The North Latitude Plant Materials Center works to promote Alaska-produced agricultural crops for use in revegetation and seed production.

Core Services

- Evaluation, testing, production, development, and distribution of materials to resource industries to meet environmental requirements that includes the development of a native seed industry.
- Cost-effective practices, for production, and distribution of seed potatoes and plant materials to the produce and forage industries.
- New native and introduced seed for research and industry through collection projects.
- Recognized as the authority on reclamation, revegetation, wetland rehabilitation and commercialization of native species through its release of new crops and expansion on the more basic research undertaken at the University of Alaska.
- With systematic evaluation throughout the state, data on revegetation is collected and distributed by way of reports. This data on plant performance is also used to develop new commercial crops for Alaska production.
- New native crops designed for rehabilitation and reclamation, breeder seed and foundation seed of traditional grasses and grain is also produced for later sale to commercial seed producers for further multiplication and sale.
- Encourage private seed producers to grow certified, registered, and in some cases, foundation native seed.
- Develop cost-effective reclamation techniques for industry and develop supplies of native seed needed by industry.
- Assist industry in compliance of environmental regulations in revegetation and erosion control.
- Provide seed industry and seed users with northern latitude adapted species.
- Develop techniques for cleaning seed.
- Transfer knowledge to end users through demonstration and education programs.
- Market seed through specifications.
- Cooperate with UAF and other agencies.

End Results	Strategies to Achieve Results
<p>A: By doing demonstration and evaluation projects, we market and develop Plant material in Alaska for commercial seed production.</p> <p><u>Target #1:</u> 450 Plant Material collections evaluated and grown by the PMC each year. <u>Measure #1:</u> Number of collections evaluated and grown.</p> <p><u>Target #2:</u> Maintain twenty five or more Off-Site evaluation and Demonstration Plots. <u>Measure #2:</u> Number of sites established, maintained and planned.</p>	<p>A1: Ensure that plant materials are available for agriculture and environmental activities through the North Latitude Plant Materials Center.</p> <p><u>Target #1:</u> Meet 100% of requests for true seed originating from commercial producers. <u>Measure #1:</u> Percentage of requests met</p>
End Results	Strategies to Achieve Results
<p>B: By developing revegetation specifications, we market seeds produced in Alaska.</p> <p><u>Target #1:</u> Respond to 110-120 requests for revegetation advice and specifications. <u>Measure #1:</u> Number of requests responded to during a year. Based on a historic average of 10 requests per</p>	<p>B1: Provide timely service to those who request information and have an on-line revegetation manual by FY07.</p> <p><u>Target #1:</u> Develop on-line Statewide Revegetation Manual before June 30 2007. <u>Measure #1:</u> Percentage of state agencies using the</p>

month.	manual for revegetation recommendations.
End Results	Strategies to Achieve Results
C: The Plant Materials Center is the state's repository and source for Alaska developed crop seed and plantlets. <u>Target #1:</u> Make available 66 tested and adapted crop collections for commercial production in Alaska. <u>Measure #1:</u> Total number different crop collections made available including native plants, grasses and grain to Alaska growers for in-state production.	C1: Continue to produce in an efficient manner all the needed crop cultivars or cultivar equivalents requested and needed by producers in Alaska. <u>Target #1:</u> 100 percent satisfaction from the commercial growers in Alaska. <u>Measure #1:</u> Continue to produce seed and plant materials that meet seed certification standards maintained by the Alaska Seed Growers Association.

Major Activities to Advance Strategies

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| <ul style="list-style-type: none"> • Test and develop new crops for industry. • Continue Alaska Seed Growers assistance programs. • Maintain repository of Alaska crop seeds. • Continue development of revegetation materials. • Refine revegetation recommendations and develop new techniques for land restoration. • Continue the Native Plant Commercialization and Evaluation Program. • Continue International Cooperation programs. | <ul style="list-style-type: none"> • Continue High Latitude seed acquisition programs. • Continue to market native plant seed through specifications and recommendation. • Continue seed user education programs • Continue monitoring and evaluating revegetation, reclamation, and erosion control projects. • Continue coordinating demand and supply issues with growers and users. • Continue the Ethnobotany project. |
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FY2008 Resources Allocated to Achieve Results

FY2008 Component Budget: \$2,715,100

Personnel:

Full time	12
Part time	12
Total	24

Performance Measure Detail

A: Result - By doing demonstration and evaluation projects, we market and develop Plant material in Alaska for commercial seed production.

Target #1: 450 Plant Material collections evaluated and grown by the PMC each year.

Measure #1: Number of collections evaluated and grown.

Plant Material Collections in Evaluation -PMC

Year	YTD Total	Target
2004	428	400
2005	424	400
2006	451	450
2007	450	450
2008	N/A	150

Analysis of results and challenges: The PMC documents field plantings and records planting sites. We also list sales and production in the annual report. The PMC tests and develops new crops for industry through a systematic evaluation program and off-site demonstration plot network. We have an extensive program in new

crop development. This is the basic purpose of the PMC. The 11 collections under evaluation in FY07 are accessions that have been collected throughout Alaska and the Circumpolar North.

Target #2: Maintain twenty five or more Off-Site evaluation and Demonstration Plots.

Measure #2: Number of sites established, maintained and planned.

Off-Site Evaluation Plot Totals Through out Alaska

Year	YTD Total
2004	11
2005	24
2006	26
2007	30
2008	32

Analysis of results and challenges: Off-site evaluation plots are critical aspects of product development and specification and development. They allow factual evaluation on multiple geographic and climatic regions in the diverse State of Alaska. The more off-site plots the PMC has the better the product testing & promotion becomes.

A1: Strategy - Ensure that plant materials are available for agriculture and environmental activities through the North Latitude Plant Materials Center.

Target #1: Meet 100% of requests for true seed originating from commercial producers.

Measure #1: Percentage of requests met

Percentage of Requests met

Year	YTD Total
2005	100%
2006	100%
2007	On target

Analysis of results and challenges: To date we have completed 72 requests in calendar year 06 for seed needed for projects and by seed producers.

B: Result - By developing revegetation specifications, we market seeds produced in Alaska.

Target #1: Respond to 110-120 requests for revegetation advice and specifications.

Measure #1: Number of requests responded to during a year. Based on a historic average of 10 requests per month.

Annual Revegetation Advice

Year	Calls	Solutions
2004	109	108
2005	216	214
2006	222	222
2007	231**	231**
2008	*	*

*Based on actual calls from agencies and the public.

** To date.

Analysis of results and challenges: The PMC provides information to DOT/PF, various mining companies, and engineering firms for revegetation and erosion control. These specifications are based on the evaluation plots and in most cases promote the use of Alaska produced seed. This is a marketing activity that sells Alaskan seed and assures the using agencies of high quality information and successful revegetation projects.

B1: Strategy - Provide timely service to those who request information and have an on-line revegetation manual by FY07.

Target #1: Develop on-line Statewide Revegetation Manual before June 30 2007.

Measure #1: Percentage of state agencies using the manual for revegetation recommendations.

C: Result - The Plant Materials Center is the state's repository and source for Alaska developed crop seed and plantlets.

Target #1: Make available 66 tested and adapted crop collections for commercial production in Alaska.

Measure #1: Total number different crop collections made available including native plants, grasses and grain to Alaska growers for in-state production.

Total number of crop collections available for in-state production

Year	CROPS*	YTD Total
2004	50	50
2005	58	50
2006	57	57
2007	70	70
2008	81	81

Analysis of results and challenges: The total number of crops made available for commercial production in-state is the true result of the Facility. That is why we exist. The materials are a critical link for a commercial seed industry. This is the so called "seed corn" or the primary source of high quality seed for animal forage, revegetation species and grain. This also represents the species and varieties specifically developed for use in Alaska. There is no other source of basic foundation class seed for these varieties in the world.

C1: Strategy - Continue to produce in an efficient manner all the needed crop cultivars or cultivar equivalents requested and needed by producers in Alaska.

Target #1: 100 percent satisfaction from the commercial growers in Alaska.

Measure #1: Continue to produce seed and plant materials that meet seed certification standards maintained by the Alaska Seed Growers Association.

Key Component Challenges

The Plant Materials Center is having some problems in recruiting and retaining Agronomists. The PMC faces two obstacles in recruitment, the talent and skills are not readily available in Alaska and the entry salary in the Agronomist series is not nearly high enough to recruit let alone retain qualified applicants. This dilemma is having an effect on the PMC's ability to carry forward with the programs being awarded from federal sources, as existing employees are taking higher paying jobs and new employees will likely be reluctant to accept range 16 and 18 positions. Also with reduced ARLF dollars the entire potato project at the PMC was reassessed. Much program duplication exists with federal agencies and the University of Alaska with regard to potato programs. The PMC's activities in potatoes is now restricted to actual material ordered by seed potato growers and all speculative production stopped. Also, all disease testing shifted to the University of Alaska.

Significant Changes in Results to be Delivered in FY2008

New equipment repair shop completed in 2007.

Presently, the following federally funded projects are or will be administered by the PMC:

- 1) Native Plant Commercialization Project,
- 2) Alaska Cold Region Evaluation Project.
- 3) A quarantine facility for agricultural plant material has been redirected to become a potato production lab and remaining funds will be used to move Greenhouses from Trunk Road to PMC.

- 4) A project forwarded by the PMC will be a 3-year \$300.0 per annum request for an Alaska seed growers' assistance project. The project will provide on-farm assistance to established grass and grain seed growers. This program will, it is hoped, be conducted in cooperation with the Alaska Department of Transportation and Public Facilities, as they are the major buyer of Alaska produced seed. No additional activity is expected on this project after FY07.
- 5) A project intended to work with traditional use plants and their impact in Ethno-botany has been funded and started in FY06 and FY07. This project will likely be dropped after FY08
- 6) A plan and design for a new repair shop and equipment shed phase 1 will be completed in FY07. Additional work and acquisitions will be in phase 2 during FY08.
- 7) New operating MOU was signed with UAF.

Recent events have caused some concern about the future level of federal assistance. Issues in Homeland Security, defense spending and recent natural disasters have impacted domestic programs including agriculture grant programs being used by the PMC. All federal PMC programs are for limited terms, usually five years. The Native Plant Commercialization Project will likely be phased out in 2007. PMC staff will continue to seek non-state funding for operation, equipment replacement, and capital expansion.

Alaska Ethno-Botany Project

This program will continue using existing IA authority. The collection of traditional use medicinals and neutraceuticals has become a significant issue throughout North America. This specialized form of economic botany relies not only on traditional plant science but also ethnic and cultural practices of small, usually disenfranchised groups of indigenous peoples. Combining the cultural aspects to plant science gives plant species a voice and political power. These traditional use plants have become a commodity with associated intellectual property issues. There is no one central unit in Alaska with the sole charge of encouraging and assisting the indigenous people to commercialize and/or protect the ethno-botanical resources on their lands or adjacent public lands. The Alaska Plant Materials Center (AKPMC), Division of Agriculture, Department of Natural Resources has worked with many of these culturally significant species with regard to collection, propagation and production. The AKPMC proposes to become the source of assistance for these resources in an unbiased fair method.

Alaska Seed Grower Assistance Program, Seed Production Manual and Statewide Revegetation Manual

The Alaska Department of Transportation and Public Facilities (DOT/PF) along with The Alaska Plant Materials Center, Division of Agriculture, and Department of Natural Resources (AKPMC) will continue to support the fledgling Alaska seed industry. Most of the product produced by the seed industry will be used on highway and airport projects. The demand exists for the seed and it is never available in adequate quantities sufficient to address the need.

The Federal Highway Administration strongly encourages and in some cases demands that native seed be used for highway projects. These species are available to the growers but few are producing the seed. Part of the reluctance is that it is not a traditional crop with which they are familiar. On-farm technical support and research is needed to get more people involved in seed production. Also, the manuals will assist the growers in production and marketing of seed. They will also assist DOT/PF with seed mix selection and use.

Major Component Accomplishments in 2006

New Seed Laboratory:

The Northern Latitude Plant Materials Center has completed construction of a new shop. This facility encompasses training areas, cleaning areas and equipment repair area. This has been a major accomplishment needed for the last decade. The new facility and remodeling of the existing lab will allow for more efficient and technically improved service to the seed industry and seed consumers of Alaska.

Seed Production

The Northern Latitude Plant Materials Center provides seed that produces in Alaska's climate conditions. Alaskan seed growers have acquired the needed seed stocks from the Plant Materials Center during the last year. The PMC has also provided new native species to the producers thereby increasing the variety of material available to commercial growers and expanding the market for their products. None of this material is being produced outside of Alaska giving the instate producers a competitive advantage. Many corporations have been involved with the seed developed by the PMC. This last year has been no exception. During the past years, Alyeska Pipeline Company, Cominco, and countless smaller companies have utilized the PMC's talent to help in restoration and revegetation issues. The PMC will continue to work with industry as it has for the past twenty-six years assuring users that plant material and technology needed for sound development will be available. In FY02, the PMC established new breeder blocks of the important revegetation species, including Polar Brome, a species not available for the last twelve years. Polar Brome is once again available for commercial production.

The PMC has in the last year expanded its international cooperation with the Falkland Islands, Iceland, the Faroe Islands, Norway, Greenland, the high arctic territory of Nunavut, Canada and last year Nunavik and Labrador regions of Canada. The Alaska Plant Materials Center has become a leader in germplasm acquisition in the high latitude regions. The potential value in climate change issues has yet to be fully determined, but Nordic countries are interested in the project.

The potato blight in the valley underscores the importance of the Plant Materials Seed program. Clean seed-potato stocks are going to be an ongoing need that will support our largest field crop in the state.

Continued evaluation plots in Alaska and adapted these plots to new site and conditions.

Increased production on fourteen new pre-certified releases of selected class germplasm.

Prepared seven more selections for release in 2007.

Completed construction on the new seed storage facility.

Completed design, bidding/contractual phase and construction of the new PMC equipment repair shop.

Complete bidding and design phase of the greenhouse move capital project.

Develop cooperative agreement for China export potato project.

Plan and obtain permits for the 2007 seed collection project in Canada

Statutory and Regulatory Authority

AS 03.22

Contact Information
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North Latitude Plant Material Center Component Financial Summary

All dollars shown in thousands

	FY2006 Actuals	FY2007 Management Plan	FY2008 Governor
Non-Formula Program:			
Component Expenditures:			
71000 Personal Services	1,168.7	1,556.4	1,693.5
72000 Travel	30.2	91.2	91.2
73000 Services	198.4	662.2	607.0
74000 Commodities	97.4	342.1	271.2
75000 Capital Outlay	21.3	52.2	52.2
77000 Grants, Benefits	0.0	0.0	0.0
78000 Miscellaneous	0.0	0.0	0.0
Expenditure Totals	1,516.0	2,704.1	2,715.1
Funding Sources:			
1002 Federal Receipts	587.8	1,063.1	953.3
1005 General Fund/Program Receipts	3.1	14.5	14.5
1007 Inter-Agency Receipts	262.9	896.3	807.0
1021 Agricultural Loan Fund	622.7	626.6	832.0
1061 Capital Improvement Project Receipts	28.2	36.6	36.6
1108 Statutory Designated Program Receipts	11.3	67.0	71.7
Funding Totals	1,516.0	2,704.1	2,715.1

Estimated Revenue Collections

Description	Master Revenue Account	FY2006 Actuals	FY2007 Management Plan	FY2008 Governor
Unrestricted Revenues				
None.		0.0	0.0	0.0
Unrestricted Total		0.0	0.0	0.0
Restricted Revenues				
Federal Receipts	51010	587.8	1,063.1	953.3
Interagency Receipts	51015	262.9	896.3	807.0
General Fund Program Receipts	51060	3.1	14.5	14.5
Statutory Designated Program Receipts	51063	11.3	67.0	71.7
Capital Improvement Project Receipts	51200	28.2	36.6	36.6
Restricted Total		893.3	2,077.5	1,883.1
Total Estimated Revenues		893.3	2,077.5	1,883.1

**Summary of Component Budget Changes
From FY2007 Management Plan to FY2008 Governor**

All dollars shown in thousands

	<u>General Funds</u>	<u>Federal Funds</u>	<u>Other Funds</u>	<u>Total Funds</u>
FY2007 Management Plan	14.5	1,063.1	1,626.5	2,704.1
Adjustments which will continue current level of service:				
-Fund Source Adjustment for Retirement Systems Increases	0.0	-96.7	96.7	0.0
Proposed budget decreases:				
-Interagency Receipts Reduction to Meet Anticipated Budget Needs	0.0	0.0	-89.3	-89.3
-Federal Receipts Reduction to Meet Anticipated Budget Needs	0.0	-109.8	0.0	-109.8
Proposed budget increases:				
-FY 08 Retirement Systems Rate Increases	0.0	96.7	113.4	210.1
FY2008 Governor	14.5	953.3	1,747.3	2,715.1

**North Latitude Plant Material Center
Personal Services Information**

Authorized Positions			Personal Services Costs	
	<u>FY2007</u> <u>Management</u> <u>Plan</u>	<u>FY2008</u> <u>Governor</u>		
Full-time	14	12	Annual Salaries	939,205
Part-time	12	12	Premium Pay	0
Nonpermanent	0	0	Annual Benefits	756,814
			<i>Less 0.15% Vacancy Factor</i>	(2,519)
			Lump Sum Premium Pay	0
Totals	26	24	Total Personal Services	1,693,500

Position Classification Summary

Job Class Title	Anchorage	Fairbanks	Juneau	Others	Total
Administrative Clerk III	0	0	0	1	1
Agronomist I	0	0	0	6	6
Agronomist II	0	0	0	3	3
Agronomist III	0	0	0	1	1
Maint Gen Journey	0	0	0	1	1
Maint Gen Lead	0	0	0	1	1
Maint Gen Sub - Journey I	0	0	0	10	10
Maint Spec Bfc Jrny II/Lead	0	0	0	1	1
Totals	0	0	0	24	24